Amendments to the Claims:

This listing replaces all prior listings of claims in the application:

Listing of Claims:

1.-57. (Cancelled).

58. (Previously presented) An isolated polynucleotide comprising a nucleic acid encoding a polypeptide having
(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO:2;
(b) 60% or greater sequence identity to domain A of SEQ ID NO:2; and
(c) 60% or greater sequence identity to domain B of SEQ ID NO:2,
said polypeptide effective for catalysing the hydroxylation of campestanol.

59. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has from 85% to 90% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

60. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has from 90% to 95% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

61. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has from 95% to 98% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

62. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has the amino acid sequence set forth in SEQ ID NO: 2.

63. (Previously presented) The polynucleotide of claim 58, wherein said polynucleotide further comprises a control element operably linked to said nucleic acid encoding said polypeptide.

64. (Previously presented) The polynucleotide of claim 63, wherein said control element is a tissue-specific promoter.

65. (Previously presented) The polynucleotide of claim 63, wherein said control element is an embryonic storage protein promoter.

66. (Previously presented) The polynucleotide of claim 63, wherein said control element comprises nucleotides 2102 to 3202 of SEQ ID NO: 1.

67. (Previously presented) An isolated polynucleotide comprising a nucleic acid encoding a polypeptide having
(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;
(b) 60% or greater sequence identity to domain A of SEQ ID NO:2;
(c) 60% or greater sequence identity to domain B of SEQ ID NO:2,
said polypeptide effective for catalysing the hydroxylation of 6-oxocampestanol.

68. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has from 85% to 90% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

69. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has from 90% to 95% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

70. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has from 95% to 98% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

71. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has the amino acid sequence set forth in SEQ ID NO: 2.

72. (Previously presented) The polynucleotide of claim 67, wherein said polynucleotide further comprises a control element operably linked to said nucleic acid encoding said polypeptide.

73. (Previously presented) The polynucleotide of claim 72, wherein said control element is a tissue-specific promoter.

74. (Previously presented) The polynucleotide of claim 72, wherein said control element is an embryonic storage protein promoter.

75. (Previously presented) The polynucleotide of claim 72, wherein said control element comprises nucleotides 2102 to 3202 of SEQ ID NO: 1.

76. (Previously presented) A transgenic plant containing at least one exogenous polynucleotide, said at least one exogenous polynucleotide comprising a nucleic acid encoding a polypeptide having
(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;
(b) 60% or greater sequence identity to domain A of SEQ ID NO:2;
(c) 60% or greater sequence identity to domain B of SEQ ID NO:2, and
a control element operably linked to said nucleic acid encoding said polypeptide, wherein said polypeptide is effective for catalysing the hydroxylation of campestanol.

77. (Previously presented) The plant of claim 76, wherein said polypeptide has from 85% to 90% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

78. (Previously presented) The plant of claim 76, wherein said polypeptide has from 90% to 95% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

79. (Previously presented) The plant of claim 76, wherein said polypeptide has from 95% to 98% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

80. (Previously presented) The plant of claim 76, wherein said polypeptide has the amino acid sequence set forth in SEQ ID NO: 2.

81. (Cancelled).

82. (Previously presented) The plant of claim 76, wherein said control element is a tissue-specific promoter.

83. (Previously presented) The plant of claim 76, wherein said control element is an embryonic storage protein promoter.

84. (Previously presented) The plant of claim 76, wherein said control element comprises nucleotides 2102 to 3202 of SEQ ID NO: 1.

85. (Previously presented) A transgenic plant containing at least one exogenous polynucleotide, said at least one exogenous polynucleotide comprising a nucleic acid encoding a polypeptide having

(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;

(b) 60% or greater sequence identity to domain A of SEQ ID NO:2; and

(c) 60% or greater sequence identity to domain B of SEQ ID NO:2,

and wherein said polypeptide is effective for catalysing the hydroxylation of 6-oxocampestanol.

86. (Previously presented) A method of making a transgenic plant comprising introducing into a plant a polynucleotide comprising a nucleotide sequence encoding a polypeptide effective for catalysing the hydroxylation of campestanol and having
(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;
(b) 60% or greater sequence identity to domain A of SEQ ID NO:2; and
(c) 60% or greater sequence identity to domain B of SEQ ID NO:2, thereby making said transgenic plant.

87. (Previously presented) A method of making a transgenic plant comprising introducing into a plant a polynucleotide comprising a nucleotide sequence encoding a polypeptide effective for catalysing the hydroxylation of 6-oxocampestanol and having
(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;
(b) 60% or greater sequence identity to domain A of SEQ ID NO:2;
(c) 60% or greater sequence identity to domain B of SEQ ID NO:2, thereby making said transgenic plant.

88. (Previously presented) An isolated polynucleotide comprising nucleotides 2102 to 3202 of SEQ ID NO: 1.

89. (Previously presented) The isolated polynucleotide of claim 88, wherein said polynucleotide comprises nucleotides 1 to 3202 of SEQ ID NO: 1.

90. (Cancelled).

91. (Previously presented) A plant or bacterial host cell comprising the polynucleotide of claim 63.

92. (Previously presented) A plant or bacterial host cell comprising the polynucleotide of claim 72.

93. (Previously presented) A method of producing a polypeptide comprising the steps of:

(a) providing the host cell of claim 91; and

(b) culturing said host cell under conditions whereby said polypeptide encoded by said nucleic acid is expressed.

94. (Previously presented) A method of producing a polypeptide comprising the steps of:

(a) providing the host cell of claim 92; and

(b) culturing said host cell under conditions whereby said polypeptide encoded by said nucleic acid is expressed.

95. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

96. (Previously presented) The polynucleotide of claim 58, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

97. (Previously presented) The polynucleotide of claim 63, wherein said control element directs expression in vegetative tissue of a plant.

98. (Previously presented) The polynucleotide of claim 97, wherein said vegetative tissue is root tissue.

99. (Previously presented) The polynucleotide of claim 97, wherein said vegetative tissue is shoot tissue.

100. (Previously presented) The polynucleotide of claim 97, wherein said vegetative tissue is leaf tissue.

101. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

102. (Previously presented) The polynucleotide of claim 67, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

103. (Previously presented) The polynucleotide of claim 72, wherein said control element directs expression in vegetative tissue of a plant.

104. (Previously presented) The polynucleotide of claim 103, wherein said vegetative tissue is root tissue.

105. (Previously presented) The polynucleotide of claim 103, wherein said vegetative tissue is shoot tissue.

106. (Previously presented) The polynucleotide of claim 103, wherein said vegetative tissue is leaf tissue.

107. (Previously presented) The transgenic plant of claim 76, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

108. (Previously presented) The transgenic plant of claim 76, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

109. (Previously presented) The transgenic plant of claim 76, wherein said control element directs expression in vegetative tissue of a plant.

110. (Previously presented) The transgenic plant of claim 109, wherein said vegetative tissue is root tissue.

111. (Previously presented) The transgenic plant of claim 109, wherein said vegetative tissue is shoot tissue.

112. (Previously presented) The transgenic plant of claim 109, wherein said vegetative tissue is leaf tissue.

113. (Previously presented) The transgenic plant of claim 85, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

114. (Previously presented) The transgenic plant of claim 85, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

115. (Previously presented) The transgenic plant of claim 85, wherein said control element directs expression in vegetative tissue of a plant.

116. (Previously presented) The transgenic plant of claim 115, wherein said vegetative tissue is root tissue.

117. (Previously presented) The transgenic plant of claim 115, wherein said vegetative tissue is shoot tissue.

118. (Previously presented) The transgenic plant of claim 115, wherein said vegetative tissue is leaf tissue.

119. (Previously presented) The method of claim 86, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

120. (Previously presented) The method of claim 86, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

121. (Previously presented) The method of claim 87, wherein said polypeptide has from 55% to 60% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

122. (Previously presented) The method of claim 87, wherein said polypeptide has from 70% to 85% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2.

123. (Currently amended) An isolated polynucleotide comprising a nucleic acid encoding a polypeptide having

(a) greater than 43% sequence identity to the amino acid sequence set forth in SEQ ID NO: 2;

(b) 60% or greater sequence identity to domain A of SEQ ID NO:2; and

(c) 60% or greater sequence identity to domain B of SEQ ID NO:2,

said polypeptide effective for ~~modulating~~ increasing one or more phenotypic traits selected from the group consisting of brassinosteroid synthesis, cell length, period of flowering, seed production, seed size, leaf size, and hypocotyl length.

124. (Cancelled) The isolated polynucleotide of claim 123, wherein said modulation is a decrease in one or more of said phenotypic traits.

125. (Previously presented) The isolated polynucleotide of claim 124, wherein said modulation is an increase in one or more of said phenotypic traits.

126. (Cancelled) The isolated polynucleotide of claim 123, wherein said phenotypic trait is a *dwf4* phenotypic trait.

127. (Previously presented) The isolated polynucleotide of claim 58 or 67, wherein said polypeptide has from 70% to 85% sequence identity to domain A of SEQ ID NO:2 and from 70% to 85% sequence identity to domain B of SEQ ID NO:2.

128. (Previously presented) The isolated polynucleotide of claim 127, wherein said polypeptide has from 85% to 90% sequence identity to domain A of SEQ ID NO:2 and from 85% to 90% sequence identity to domain B of SEQ ID NO:2.

129. (Previously presented) The isolated polynucleotide of claim 127, wherein said polypeptide has from 90% to 95% sequence identity to domain A of SEQ ID NO:2 and from 90% to 95% sequence identity to domain B of SEQ ID NO:2.

130. (Previously presented) The transgenic plant of claim 76 or 85, wherein said polypeptide has from 70% to 85% sequence identity to domain A of SEQ ID NO:2 and from 70% to 85% sequence identity to domain B of SEQ ID NO:2.

131. (Previously presented) The transgenic plant of claim 130, wherein said polypeptide has from 85% to 90% sequence identity to domain A of SEQ ID NO:2 and from 85% to 90% sequence identity to domain B of SEQ ID NO:2.

132. (Previously presented) The transgenic plant of claim 130, wherein said polypeptide has from 90% to 95% sequence identity to domain A of SEQ ID NO:2 and from 90% to 95% sequence identity to domain B of SEQ ID NO:2.

Amendments to the Drawings:

The attached replacement sheets of drawings include revised formal versions of FIGs. 1-12 and replace the original sheets that included FIGs. 1-12.

FIG. 1 has been enlarged to increase font size and clarity of the structures, resulting in the separation of the figure onto sheets 1A and 1B.

FIG. 2 has been enlarged and labeled FIG. 2A and FIG. 2B; bold rectangles have been changed to open rectangles in FIG. 2A.

FIG. 3 has been enlarged to increase font type and clarity of the letters, resulting in the separation of the figure onto sheets 3A and 3B.

FIG. 5 has had filled circles and squares replaced with open circles and squares.

FIG. 6 has had bold rectangles changed to hatched rectangles.

FIG. 7 has had bold rectangles changed to open rectangles.

FIG. 8 has had bold rectangles changed to open rectangles.

FIG. 9 has had bold rectangles changed to open rectangles.

FIG. 10 has been enlarged to increase font size, resulting in an increase of sheets from 10A to 10M, rather than 10G.

FIG. 11 has been enlarged to increase font size.

FIG. 12 has had bold rectangles changed to hatched rectangles.

Attachments following last page of this Amendment:

Replacement Sheets (25 pages)
Annotated Sheets Showing Change(s) (16 pages)